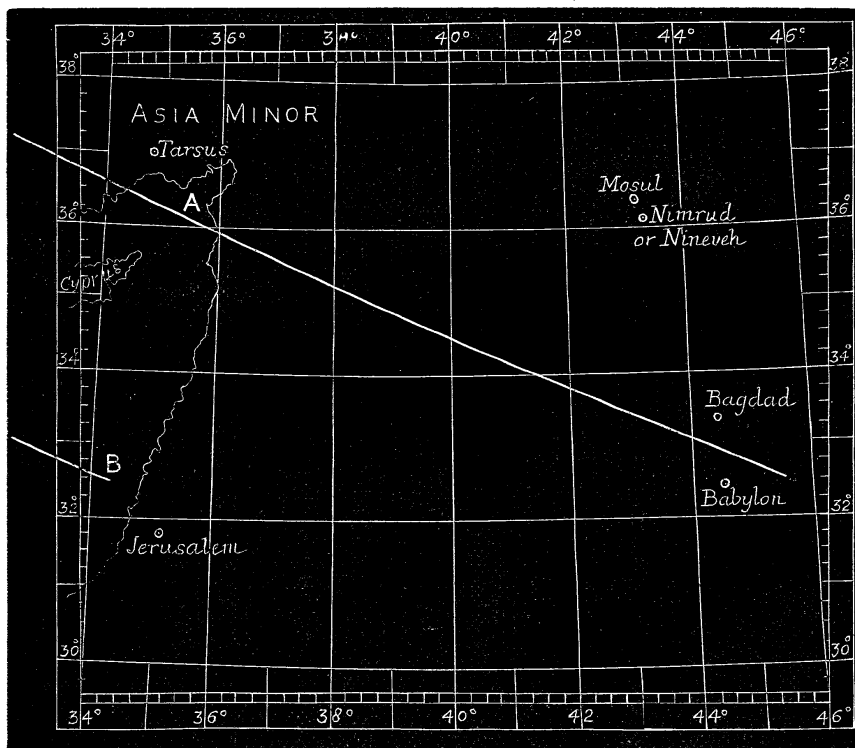


is highly probable that the comet has escaped observation in the northern hemisphere. I trust, therefore, that the observations and elements which I have communicated may be of interest to the Society.

Observatory, Windsor, N.S. Wales :
1884 March 4.

Note on the Eclipse of Thales. By J. Maguire.

The solar eclipse of Thales, B.C. May 28, 585, has been calculated by eminent astronomers from Hansen's Lunar Tables, altered and unaltered. At the time of their publication, more than a quarter of a century ago, they were used by Sir G. B. Airy, then Astronomer Royal, for the calculation of this eclipse in Asia



Minor, as shown on his map in vol. xxvi. of the *Memoirs*. In this volume the latitudes and longitudes are given for points on the central and limiting lines of the shadow, but not the times at which the phase occurs. I adopted the Right Ascensions and Declinations of the Sun and Moon at the hours of two and four, as given under the letter K in the elements; and though I had no doubt of their accuracy, I nevertheless extracted all the par-

ticulars from the tables, and found a difference of only $3''$ in the Moon's Right Ascension. For $3^h 37^m$ the data will be

		R.A.		Dec.	
☾	...	$58^{\circ} 12' 43'' \cdot 3$		$20^{\circ} 54' 46'' \cdot 9$	} (D)
			$a \text{ corr.}$	$0 \quad 7 \cdot 7$	
☉	...	$57^{\circ} 19' 44'' \cdot 6$		$20^{\circ} 20' 43'' \cdot 6$	
a	...	$0 \quad 52 \quad 58 \cdot 7$	x	$0 \quad 34 \quad 11$	
<hr/>					
$P - n = 3 \cdot 5643583$					
$p \ 36^{\circ} \quad 9 \cdot 9995010$					
<hr/>					
$P' \quad 3 \cdot 5638593$					

The equation of time is taken $+9^m 8^s$, and the calculations made according to the method of Woolhouse, the resulting latitude being $35^{\circ} 57' 32''$, and longitude $35^{\circ} 50' 45''$: A representing this position on the accompanying map. Four more points on the central line have been calculated—the last being at $3^h 38^m 36^s$ in latitude $32^{\circ} 28' 50''$, and longitude $45^{\circ} 33' 8''$, the place of central ending—Bagdad and Babylon being within the limits of totality.

In 1872 it appears that Dr. Hind wrote a letter to the *Times*, which was copied into the *Astronomical Register* for September in that year, and giving an interesting account of several historical eclipses, among which is the famous one of Thales. He states at the outset that he employed the last value of the secular acceleration of the Moon's mean motion given by Hansen, and combined other important elements determined by him with the result of Leverrier's Tables of the Sun. He says his new calculation indicates that the eclipse was *total* in Nimrud for between three and four minutes shortly before sunset.

In 1879 Professor S. Newcomb, from his own Tables has placed the track of the *central* eclipse in the Mediterranean, the last position given being at B on the map, in latitude $32^{\circ} 30'$, and longitude $34^{\circ} 12'$.

As the celebrated and decisive battle between the Medes and Lydians is not supposed to have been fought near Jerusalem, nor to have been a naval engagement in the Mediterranean, the Professor's determination shows that if the battle-field is assumed to be in Asia Minor, the eclipse there must have been a *partial* one.

These are rather discordant results, the difference between the north and south determinations of centrality being about six degrees.

Norwich: 1884 May 13.

H H